

REMARKS

Initially applicant would like to thank Examiner Dinh for granting an interview and for his time spent during the interview.

Claims 1-3, 6-8, 10, 12, 13, 22-27 and 29-33 were previously pending in the application. Claims 5, 11, 14-21 and 28 were previously withdrawn as being directed to a non-elected species. Claims 1-3, 5 and 10 are canceled and new claims 34-36 are added. Therefore, claims 6-8 and 11-36 are presented for consideration.

Applicant would also like to thank Examiner Dinh for indicating that claims 10, 12 and 13 are allowable and that claims 30, 31 and 33 are allowed. In reliance thereon, claim 6 is amended to include the allowable subject matter of claim 10.

Claims 1-3, 6-8, 10, 12, 13, 22-27 and 29-33 are rejected under 35 USC §112, first paragraph. This rejection is respectfully traversed.

As set forth at the interview, MPEP §2164.05 (a copy of the relevant section is submitted herewith) states that applicant may "cite references to show what one skilled in the art knew at the time of filing the application."

Applicant in the Amendment of June 30, 2003 had cited GOUIN 3,288,396 Figure 1 and ROSTA et al. 3,606,209 element 15 in Figure 1. The above noted MPEP section does not require these

references to be incorporated into the present specification or that these references be submitted as part of an Information Disclosure Statement; the references must only be cited, which applicant has done. Accordingly, applicant asserts that at the time of filing the present application, one of ordinary skill in the art would know how to rotate blades connected at joint rings.

Further, MPEP §2164.05(a) states that 35 USC §112 requires the specification to be enabling only to a person "skilled in the art to which it pertains, or with which it is most nearly connected" and that the specification need not disclose what is well known to those skilled in the art and preferably omits that which is well known to those skilled and already available to the public. Rotatable blades connected to joint rings are known in the art and need not be disclosed in the present specification. Therefore, reconsideration and withdrawal of the rejection are respectfully requested.

Claims 1-3, 6-8, 22, 25, 27, 29 and 32 are rejected as anticipated by ROSTA et al. 3,606,209. This rejection is respectfully traversed.

Claims 1-3 are cancelled and claim 6 is amended to include the allowable subject matter of claim 10 and thus is believed allowable. Claims 7, 8, 22, 25, 27 and 32 depend from claim 6 and further define the invention and are also believed patentable.

Claim 29 has also been amended to include the subject matter of claim 10. As noted at the interview, such amendment should place claim 29 in condition for allowance.

Claims 23 and 26 are rejected as unpatentable over ROSTA et al. in view of LANGFORD, III 5,106,035 and MARSI 6,158,960. This rejection is respectfully traversed.

LANGFORD, III is only cited for the teaching of electric motors to rotate rotors powered by fuel cells. MARSI is only cited for the teaching of using electric motors to change the blade angles. Neither LANGFORD, III nor MARSI teach or suggest what is recited in claim 6. As set forth above, ROSTA et al. do not disclose what is recited in claim 6. Since claims 23 and 26 depend from claim 6 and further define the invention, the combination of references does not render obvious claims 23 and 26.

Claim 24 is rejected as unpatentable over ROSTA et al. in view of LANGFORD, III and ITURRALDE 5,683,060. This rejection is respectfully traversed.

ITURRALDE is only cited for the teaching of surfaces made up of solar cells. ITURRALDE does not teach or suggest what is recited in claim 6. As set forth above, ROSTA et al. in view of LANGFORD, III do not teach or suggest what is recited in claim 6. Since claim 24 depends from claim 6 and further defines the

invention, the combination of the references would not render obvious claim 24.

New claim 34 is supported by Figure 1a, for example and new claims 35 and 36 include subject matter previously recited in claims 30 and 31, respectively.

In view of the present amendment and the foregoing remarks, it is believed that the present application has been placed in condition for allowance. Reconsideration and allowance are respectfully requested.

Since claim 6 is believed in condition for allowance and since claim 6 is believed generic, reconsideration and allowance of claims 11, 14-21 and 28 are respectfully requested. Each of the withdrawn claims are believed consistent with claim 6 as presently amended.

Accordingly, entry of the above amendments is earnestly solicited. Applicant respectfully requests that a timely Notice of Allowance be issued in this case.

Should there be any matters that need to be resolved in the present application, the Examiner is respectfully requested to contact the undersigned at the telephone number listed below.

Respectfully submitted,

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LM/lrs

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Appendix:

The Appendix includes the following items:

- pages 2100-179 and 2100-180 of MPEP §2164.05

According to *In re Bowen*, 492 F.2d 859, 862-63, 51 USPQ 48, 51 (CCPA 1974), the minimal requirement for the examiner to give reasons for the uncertainty of the enablement. This standard is applicable when there is no evidence in the record of operation without undue experimentation beyond the disclosed embodiments. See also *In re Brana*, 51 F.3d 1566, 34 USPQ2d 1436, 1441 (Fed. Cir. 1995) (*In re Bundy*, 642 F.2d 430, 433, 209 USPQ 48, 34 CCPA 1981)) (discussed in MPEP § 2164.07 regarding the relationship of the enablement requirement to the utility requirement of 35 U.S.C. 101).

While the analysis and conclusion of a lack of enablement are based on the factors discussed in § 2164.01(a) and the evidence as a whole, it is necessary to discuss each factor in the written rejection. The language should focus on the factors, reasons, and evidence that lead the examiner to conclude that the specification fails to allow to make and use the claimed invention without undue experimentation, or that the scope of enablement provided to one skilled in the art is not commensurate with the scope of protection sought by the claims. This can be done by making specific findings of fact, supported by the evidence, and then drawing conclusions based on these findings of fact. For example, doubt may arise about enablement if use information is missing about one or more of the critical parts or relationships between parts which one skilled in the art could not develop without undue experimentation. In such a case, the examiner should specifically identify what information is missing and what one skilled in the art could not supply the information without undue experimentation. See MPEP § 2164.06(a). References should be supplied if possible to support a *prima facie* case of lack of enablement, but are not always required. *In re Marzocchi*, 70 F.2d 220, 224, 169 USPQ 367, 370 (CCPA 1971). However, specific technical reasons are always required.

In accordance with the principles of compact prosecution, if an enablement rejection is appropriate, the Office action on the merits should present the case with all the relevant reasons, issues, and evidence so that all such rejections can be withdrawn if the applicant provides appropriate convincing arguments or evidence in rebuttal. Providing the best case in the first Office action will also allow the second

Office action to be made final should applicant fail to provide appropriate convincing arguments and/or evidence. Citing new references and/or expanding arguments in a second Office action could prevent that Office action from being made final. The principles of compact prosecution also dictate that if an enablement rejection is appropriate and the examiner recognizes limitations that would render the claims enabled, the examiner should note such limitations to applicant as early in the prosecution as possible.

In other words, the examiner should always look for enabled, allowable subject matter and communicate to applicant what that subject matter is at the earliest point possible in the prosecution of the application.

2164.05 Determination of Enablement Based on Evidence as a Whole

Once the examiner has weighed all the evidence and established a reasonable basis to question the enablement provided for the claimed invention, the burden falls on applicant to present persuasive arguments, supported by suitable proofs where necessary, that one skilled in the art would be able to make and use the claimed invention using the application as a guide. *In re Brandstadter*, 484 F.2d 1395, 1406-07, 179 USPQ 286, 294 (CCPA 1973). The evidence provided by applicant need not be conclusive but merely convincing to one skilled in the art.

Applicant may submit factual affidavits under 37 CFR 1.132 or cite references to show what one skilled in the art knew at the time of filing the application. A declaration or affidavit is, itself, evidence that must be considered. The weight to give a declaration or affidavit will depend upon the amount of factual evidence the declaration or affidavit contains to support the conclusion of enablement. *In re Buchner*, 929 F.2d 660, 661, 18 USPQ2d 1331, 1332 (Fed. Cir. 1991) ("expert's opinion on the ultimate legal conclusion must be supported by something more than a conclusory statement"); cf. *In re Alton*, 76 F.3d 1168, 1174, 37 USPQ2d 1578, 1583 (Fed. Cir. 1996) (declarations relating to the written description requirement should have been considered).

Applicant should be encouraged to provide any evidence to demonstrate that the disclosure enables the claimed invention. In chemical and biotechnical applications, evidence actually submitted to the FDA

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to obtain approval for clinical trials may be submitted. However, considerations made by the FDA for approving clinical trials are different from those made by the PTO in determining whether a claim is enabled. See *Scott v. Finney*, 34 F.3d 1058, 1063, 32 USPQ2d 1115, 1120 (Fed. Cir. 1994) ("Testing for full safety and effectiveness of a prosthetic device is more properly left to the [FDA]"). Once that evidence is submitted, it must be weighed with all other evidence according to the standards set forth above so as to reach a determination as to whether the disclosure enables the claimed invention.

To overcome a *prima facie* case of lack of enablement, applicant must demonstrate by argument and/or evidence that the disclosure, as filed, would have enabled the claimed invention for one skilled in the art at the time of filing. This does not preclude applicant from providing a declaration after the filing date which demonstrates that the claimed invention works. However, the examiner should carefully compare the steps, materials, and conditions used in the experiments of the declaration with those disclosed in the application to make sure that they are commensurate in scope; i.e., that the experiments used the guidance in the specification as filed and what was well known to one of skill in the art. Such a showing also must be commensurate with the scope of the claimed invention, i.e., must bear a reasonable correlation to the scope of the claimed invention.

The examiner must then weigh all the evidence before him or her, including the specification and any new evidence supplied by applicant with the evidence and/or sound scientific reasoning previously presented in the rejection and decide whether the claimed invention is enabled. The examiner should never make the determination based on personal opinion. The determination should always be based on the weight of all the evidence.

2164.05(a) Specification Must Be Enabling as of the Filing Date

Whether the specification would have been enabling as of the filing date involves consideration of the nature of the invention, the state of the prior art, and the level of skill in the art. The initial inquiry is into the nature of the invention, i.e., the subject matter to which the claimed invention pertains. The nature of the invention becomes the backdrop to determine the

state of the art and the level of skill possessed by one skilled in the art.

The state of the prior art is what one skilled in the art would have known, at the time the application was filed, about the subject matter to which the claimed invention pertains. The relative skill of those in the art refers to the skill of those in the art in relation to the subject matter to which the claimed invention pertains at the time the application was filed. See MPEP § 2164.05(b).

The state of the prior art provides evidence for the degree of predictability in the art and is related to the amount of direction or guidance needed in the specification as filed to meet the enablement requirement. The state of the prior art is also related to the need for working examples in the specification.

The state of the art for a given technology is not static in time. It is entirely possible that a disclosure filed on January 2, 1990, would not have been enabled. However, if the same disclosure had been filed on January 2, 1996, it might have enabled the claims. Therefore, the state of the prior art must be evaluated for each application based on its filing date.

35 U.S.C. 112 requires the specification to be enabling only to a person "skilled in the art to which it pertains, or with which it is most nearly connected." In general, the pertinent art should be defined in terms of the problem to be solved rather than in terms of the technology area, industry, trade, etc. for which the invention is used.

The specification need not disclose what is well-known to those skilled in the art and preferably omits that which is well-known to those skilled and already available to the public. *In re Buchner*, 929 F.2d 660, 661, 18 USPQ2d 1331, 1332 (Fed. Cir. 1991); *Hybritech, Inc. v. Monoclonal Antibodies, Inc.*, 802 F.2d 1367, 1384, 231 USPQ 81, 94 (Fed. Cir. 1986), *cert. denied*, 480 U.S. 947 (1987); and *Lindemann Maschinenfabrik GMBH v. American Hoist & Derrick Co.*, 730 F.2d 1452, 1463, 221 USPQ 481, 489 (Fed. Cir. 1984).

The state of the art existing at the filing date of the application is used to determine whether a particular disclosure is enabling as of the filing date. Publications dated after the filing date providing information publicly first disclosed after the filing date generally cannot be used to show what was known at the time of filing. *In re Gunn*, 537 F.2d 1123, 1128, 190 USPQ

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